ELSEVIER

Journal of Organometallic Chemistry 575 (1999) 325

Journal of Organometallic Chemistry

Author Index of Volume 575

Aisa, A.M.A., 126
Alagesan, K., 108
Alici, B., 187

Bachechi, F., 269
Badali, F., 251
Bagatur'yants, A.A., 39
Bajpai, S., 261
Bakhmutova, E.V., 39
Basato, M., 163
Bastl, Z., 246
Batsanov, A.S., 223
Baumeister, J.M., 214
Benetollo, F., 193
Bertani, C., 163
Birri, A., 242
Blacque, O., 278
Bombieri, G., 193
Brik, M.E., 149
Bruneau, C., 187
Brüning, K., 153
Budnikova, Y., 63
Burger, P., 214
Burini, A., 269

Cecconi, F., 119
Çetinkaya, B., 187
Cheraïti, N., 149
Choukroun, R., 87

Del Pra, A., 193
Demaimay, F., 145
Dixneuf, P.H., 187

Enke, S., 126

Galassi, R., 269
Gardiner, M.G., 80
Garrioch, R.M., 57
Gaudemer, A., 149
Ghilardi, C.A., 119
Gimenez, J., 286
Głowiak, T., 98
Grandberg, K.I., 39
Grassi, A., 163
Grillone, M.D., 193

Henderson, W., 171
Herrmann, W.A., 80
Hirao, T., 76
Hor, T.S.A., 171, 223
Howard, J.A.K., 39, 223
Huttner, G., 133

Ienco, A., 119
Ishikawa, T., 76
Issa, W., 251

Jacobi, A., 133

Ka-Hong Lee, K., 200
Karchava, A.V., 39
Kargin, Y., 63
Kaya, C., 209
Ko, B.-T., 67
Koga, Y., 246
Köhler, F.H., 33
Kuang, S.-M., 51
Kuballa, P., 57
Kubicki, M.M., 278
Kunesch, G., 149
Kuo, C.-Y., 67
Kuz'mina, L.G., 39

Lang, H., 133, 153
Laschat, S., 141
Leblanc, J.-C., 278
Leung, W.-P., 232
Liaw, J.-H., 310
Li, Z., 223
Lin, B.-S., 310
Lin, C.-C., 67
Lin, C.-H., 67
Lin, J.T., 301
Lin, T.-S., 310
Lis, T., 87
Liu, H., 223
Liu, Y.-H., 310
Llauro, M.-F., 286
Low, K.S., 57
Lui, X.-H., 310

Mak, T.C.W., 51, 171, 232
Michel, A., 286
Midollini, S., 119
Mok, K.F., 223
Moïse, C., 278

Nédélec, J.-Y., 63
Noiret, N., 145
Noltemeyer, M., 261

Ogawa, A., 76
Orlandini, A., 119
Oshima, K., 1
Ouchi, A., 246
Özdemir, I., 187

Pal, S.K., 108
Panov, D., 182
Patin, H., 145
Pebler, J., 108
Périchon, J., 63
Pétiaud, R., 286
Pietroni, B.R., 269

Pola, J., 246
Pool, B., 251
Po Yeo, S., 171

Richter, H., 126
Rosair, G.M., 57
Roucoux, A., 145

Sadorge, A., 278
Saitkulova, L.N., 39
Samuelson, A.G., 108
Sauvageot, P., 278
Schell, A., 33
Schmidt, H.G., 261
Schwarz, J., 80
Setsune, J.-i., 21
Severini, M., 269
Shubina, E.S., 39
Sinha, A., 261
Song, F.-Q., 232
Spiegler, M., 80
Srivastava, P.C., 261
Steed, J.W., 242
Stein, T., 133
Šubrt, J., 246
Szymańska-Buzar, T., 98

Tang, W.-D., 310
Thomas, K.R.J., 301
Tocher, D.A., 242
Trzeciak, A.M., 87
Tuulmets, A., 182

Urbanová, M., 246

Valle, G., 163

Wang, F.-C., 67
Wang, Y., 310
Wang, Y.-P., 310
Watanabe, J.-y., 21
Weber, B., 33
Weinmann, S., 133
Welch, A.J., 57
Wen, Y.S., 301
White, J.M., 251
Wolfgramm, R., 141
Wong, W.-T., 200
Wu, I.Y., 133

Xue, F., 51, 232

Zecca, M., 163
Zhang, Z.-Z., 51
Zhou, Z.-Y., 232
Ziółkowski, J.J., 87

PII S0022-328X(99)00017-0

ELSEVIER

Journal of Organometallic Chemistry 575 (1999) 326–330

Journal of Organometallic Chemistry

Subject Index of Volume 575

Addition reaction
Use of organomanganese reagents in organic synthesis, 1
Aggregate
{M_3S_2} heterometallic aggregates derived from $Pt_2(PPh_3)_4(\mu\text{-}S)_2$: structural analysis of $[MPt_2X(PPh_3)_5(\mu_3\text{-}S)_2]^+$ (M = Pd and Pt, X = Cl; M = Rh and Ir, X = CO) by X-ray single-crystal crystallography, 223
Alcoholysis
Ein einfacher Zugang zu Carbosiloxan-Dendrimeren, 153
Aldehydes
Reaction of cobalt porphyrins with aldehydes in the presence of *t*-butyl hydroperoxide, 21
Alkylsilylphosphites
Synthese und Charakterisierung von langkettigen Alkysilylphosphonaten und Alkylsilylphosphiten, 126
Alkylsilylphosphonates
Synthese und Charakterisierung von langkettigen Alkysilylphosphonaten und Alkylsilylphosphiten, 126
Alkyne complexes
Synthesis and reactivity of Mo–Sn compounds: X-ray crystal structure of a novel $[Mo(SnCl_3)_2(CO)_2(NCEt)_3]$, 98
Allyl alcohol
Ein einfacher Zugang zu Carbosiloxan-Dendrimeren, 153
Allyltrimethylsilane oxide
Silicon-directed acid ring-opening of allyltrimethylsilane oxide. X-ray structures of 3-triisopropylsilyl-2-(2,4-dinitrobenzoyloxy)-1-propanol and 3-triisopropylsilyl-2-(2,4,6-trinitrobenzoyloxy)-1-propanol, 251
Aluminum
Electronic and steric factors affecting the formation of four or five-coordinated aluminum complexes: syntheses and crystal structures of some aluminum alkoxides, 67
Amide and hydrolysis
Reaction of dibutyltin oxide with amides in presence of traces of water: multinuclear NMR study and mechanism, 286
Aqueous chemistry
The complex $[ReO\{HNN(CH_3)CS_2CH_3\}_2]Cl$, a suitable precursor for the preparation of bis(dithiocarbamato)-nitridorhenium(V) species, 145
Azoles
Reactivity of bis(diphenylphosphines)digold(I) dications with azotate neutral heterocycles: X-ray crystal structure of eclipsed $[\mu\text{-dppmAu}_2(pzH)_2]^{2+} \cdot 2ClO_4^- \cdot H_2O$ and staggered $[\mu\text{-dppeAu}_2(pzH)_2]^{2+} \cdot 2ClO_4^-$ complexes, 269

Bidentate nucleophiles
Reactivity of $[Pd_3(\mu\text{-}O_2CMe)_3(\mu\text{-MeSCHC(O)OR})_3]$ (R = Me, Et) towards bidentate nucleophiles: X-ray structure of $[Pd_2(acac)_2(\mu\text{-MeSCHC(O)OEt})_2]$, 163
Bifunctional
Electronic and steric factors affecting the formation of four or five-coordinated aluminum complexes: syntheses and crystal structures of some aluminum alkoxides, 67
Bimetallic compounds
Tuning the link of doubly silyl-bridged ferrocenes, 33
Bis(diphenylphosphine)alkane
Reactivity of bis(diphenylphosphines)digold(I) dications with azotate neutral heterocycles: X-ray crystal structure of eclipsed $[\mu\text{-dppmAu}_2(pzH)_2]^{2+} \cdot 2ClO_4^- \cdot H_2O$ and staggered $[\mu\text{-dppeAu}_2(pzH)_2]^{2+} \cdot 2ClO_4^-$ complexes, 269
Bromide
Dimethyl tellurium (IV) derivatives: synthesis, spectroscopic characterisation and structures of Me_2TeBr_2 and $Me_2Te(OCOC_6H_5)_2$, 261
Bromine–manganese exchange
Use of organomanganese reagents in organic synthesis, 1
t-Butyl hydroperoxide
Reaction of cobalt porphyrins with aldehydes in the presence of *t*-butyl hydroperoxide, 21

Carbanickelaboranes
The '1,2 to 1,2' cage carbon isomerisation in bisphosphine carbanickelaboranes: synthesis and spectroscopic and crystallographic characterisation of 1,2-Ph_2-4,4-$(PMe_2Ph)_2$-4,1,2-*closo*-$NiC_2B_9H_9$, 1,2-Ph_2-4,4-$(PEt_3)_2$-4,1,2-*closo*-$NiC_2B_9H_9$ and 1,2-Ph_2-4-(dppe)-4,1,2-*closo*-$NiC_2B_9H_9$, 57
Carbon monoxide
{M_3S_2} heterometallic aggregates derived from $Pt_2(PPh_3)_4(\mu\text{-}S)_2$: structural analysis of $[MPt_2X(PPh_3)_5(\mu_3\text{-}S)_2]^+$ (M = Pd and Pt, X = Cl; M = Rh and Ir, X = CO) by X-ray single-crystal crystallography, 223
Carbosiloxane dendrimers
Ein einfacher Zugang zu Carbosiloxan-Dendrimeren, 153
Carboxylate
Dimethyl tellurium (IV) derivatives: synthesis, spectroscopic characterisation and structures of Me_2TeBr_2 and $Me_2Te(OCOC_6H_5)_2$, 261
Catalysis
Novel rhodium(I) complexes with (2-hydroxyphenyl)-diphenylphosphine ligand: catalytic properties and X-ray structures of $Rh(OC_6H_4PPh_2)(CO)(PPh_3)$ and $Rh(OC_6H_4PPh_2)\{P(OPh)_3\}_2 \cdot 0.5C_6H_6$, 87
Catalytic synthesis of furan
2-Imidazoline– and 1,4,5,6-tetrahydropyrimidine–ruthenium(II) complexes and catalytic synthesis of furan, 187
Catecholate
Synthesis of the smallest tris-(catecholamide) siderophore analogue, 149
Chemical vapour deposition
UV laser-induced photolysis of silacyclopent-3-ene: unseparable photochemistry of reactant and product for chemical vapour deposition of Si/C/H polymer, 246
Chromium
Synthesis, spectra and crystal structure of (*E*)-$(CO)_2(NO)Cr[(\eta^5\text{-}C_5H_4)\text{–}CH\text{=}CH(\eta^5\text{-}C_5H_4)]Cr(CO)_2(NO)$, 310
Chromium arene complex
Synthesis of tricarbonyl(η^6-quinaldine)chromium(0) by a low pressure method, 141
Chromium carbonyls
The influence of the cation on the conformation of the anion μ-hydridobis[pentacarbonylchromium(0)]: crystal and molecular structure of $[(phenH)_2Cl][Cr_2(CO)_{10}(\mu\text{-H})]$ and $[K(phen)_2][Cr_2(CO)_{10}(\mu\text{-H})]$, 193

PII S0022-328X(99)00018-2

Cluster
Syntheses, reactivity studies and structural characterisation of triruthenium carbonyl methoxynitrido clusters containing phosphine ligands, 200
Cobalt porphyrins
Reaction of cobalt porphyrins with aldehydes in the presence of *t*-butyl hydroperoxide, 21
CO-factored force field
A new approach to solving the CO-factored force field of $M(CO)_4$ molecules having C_{3v} symmetry, 209
Conductivity measurements
Transition metal complexes with sterically demanding ligands. I. Synthesis and X-ray crystal structure of 1,5-cyclooctadiene palladium methyl triflate, (COD)Pd(Me)(OTf) and its cationic penta-coordinate adducts with sterically demanding 2,9-diaryl-substituted 1,10-phenanthroline ligands, 214
Conformation
The influence of the cation on the conformation of the anion μ-hydridobis[pentacarbonylchromium(0)]: crystal and molecular structure of $[(phenH)_2Cl][Cr_2(CO)_{10}(\mu\text{-}H)]$ and $[K(phen)_2][Cr_2(CO)_{10}(\mu\text{-}H)]$, 193
Copper(I)
$(\eta^5\text{-}C_5H_4SiMe_3)_2Ti(C{\equiv}C\text{–}SiMe_2\text{–}C{\equiv}CSiMe_3)_2$: a unique entry to monomeric and oligomeric alkyne–copper(I) and alkyne–silver(I) halides, 133
Crystal packing
Directional Fe–C≡O···S intermolecular interaction leading to chain-like crystal packing in binuclear Fe(0)–M(II) (M = Hg, Cd) complexes with 2-(diphenylphosphino)thiazole, 51
Crystal structure
Desulfurization and ring opening of thiirane induced by tantalocene trihydride complexes: synthesis, reactivity and X-ray structure of $Cp'_2Ta(=S)(S\text{-}^iPr)$ with $Cp' = \eta^5\text{-}C_5H'_4Bu$, 278
Methylmercury(II) and phenylmercury(II) chelated complexes with the ligand tris(2-diphenylphosphinoethyl)phosphine: synthesis, X-ray diffraction and NMR studies, 119
Ruthenocenyl ruthenium bimetallic complexes: electrospray mass spectrometric study of $[RuX(\eta^5\text{-}C_5H_5)(\eta^2\text{-dppr})]^{n+}$ (dppr = 1,1′-bis(diphenylphosphino)ruthenocene) (X = Cl, $n = 0$; X = CO, CH_3CN, C=CHPh, $n = 1$) and the X-ray crystal and molecular structure of $[Ru(\eta^5\text{-}C_5H_5)(CO)(\eta^2\text{-dppr})]PF_6$, 171
Synthesis and reactivity of Mo–Sn compounds: X-ray crystal structure of a novel $[Mo(SnCl_3)_2(CO)_2(NCEt)_3]$, 98
Synthesis, spectra and crystal structure of (E)-$(CO)_2(NO)Cr[(\eta^5\text{-}C_5H_4)\text{–}CH{=}CH(\eta^5\text{-}C_5H_4)]Cr(CO)_2(NO)$, 310
The influence of the cation on the conformation of the anion μ-hydridobis[pentacarbonylchromium(0)]: crystal and molecular structure of $[(phenH)_2Cl][Cr_2(CO)_{10}(\mu\text{-}H)]$ and $[K(phen)_2][Cr_2(CO)_{10}(\mu\text{-}H)]$, 193
CT complexes
Synthesis and characterization of novel charge transfer complexes formed by *N*,*N*′-bis(ferrocenylmethylidene)-*p*-phenylenediamine and *N*-(ferrocenylmethylidene)aniline, 108
Cyclic voltammetry
Synthesis and characterization of novel charge transfer complexes formed by *N*,*N*′-bis(ferrocenylmethylidene)-*p*-phenylenediamine and *N*-(ferrocenylmethylidene)aniline, 108
Synthesis, spectroscopy and structure of new push–pull ferrocene complexes containing heteroaromatic rings (thiophene and furan) in the conjugation chain, 301
Tuning the link of doubly silyl-bridged ferrocenes, 33
Cyclooligomerization of alkynes
Synthesis and reactivity of Mo–Sn compounds: X-ray crystal structure of a novel $[Mo(SnCl_3)_2(CO)_2(NCEt)_3]$, 98

β-Dicarbonyl complexes
Reactivity of $[Pd_3(\mu\text{-}O_2CMe)_3(\mu\text{-}MeSCHC(O)OR)_3]$ (R = Me, Et) towards bidentate nucleophiles: X-ray structure of $[Pd_2(acac)_2(\mu\text{-}MeSCHC(O)OEt)_2]$, 163
Dinuclear complexes
Reactivity of bis(diphenylphosphines)digold(I) dications with azotate neutral heterocycles: X-ray crystal structure of eclipsed $[\mu\text{-}dppmAu_2(pzH)_2]^{2+} \cdot 2ClO_4^- \cdot H_2O$ and staggered $[\mu\text{-}dppeAu_2(pzH)_2]^{2+} \cdot 2ClO_4^-$ complexes, 269
Distannoxane
Reaction of dibutyltin oxide with amides in presence of traces of water: multinuclear NMR study and mechanism, 286
Dithiocarbamate
The complex $[ReO\{HNN(CH_3)CS_2CH_3\}_2]Cl$, a suitable precursor for the preparation of bis(dithiocarbamato)nitrido-rhenium(V) species, 145
Diyne
$(\eta^5\text{-}C_5H_4SiMe_3)_2Ti(C{\equiv}C\text{–}SiMe_2\text{–}C{\equiv}CSiMe_3)_2$: a unique entry to monomeric and oligomeric alkyne–copper(I) and alkyne–silver(I) halides, 133

Electronic absorption spectra
Synthesis, spectroscopy and structure of new push–pull ferrocene complexes containing heteroaromatic rings (thiophene and furan) in the conjugation chain, 301
Electroreductive cross-coupling
Nickel-catalysed electrochemical coupling between mono- or dichlorophenylphosphines and aryl or heteroaryl halides, 63
Electrospray mass spectrometry
Ruthenocenyl ruthenium bimetallic complexes: electrospray mass spectrometric study of $[RuX(\eta^5\text{-}C_5H_5)(\eta^2\text{-dppr})]^{n+}$ (dppr = 1,1′-bis(diphenylphosphino)ruthenocene) (X = Cl, $n = 0$; X = CO, CH_3CN, C=CHPh, $n = 1$) and the X-ray crystal and molecular structure of $[Ru(\eta^5\text{-}C_5H_5)(CO)(\eta^2\text{-dppr})]PF_6$, 171
Enantiomerically-pure complexes
Synthesis and characterisation of enantiomerically-pure zirconium complexes containing a linked amido-cyclopentadienyl ligand; X-ray structures of $[Zr\{\eta^5{:}\eta^1\text{-}C_5Me_4SiMe_2NCH(Me)(Ph)\}X_2]$ (X = NMe_2 and Cl) and $[Zr\{\eta^5{:}\eta^1\text{-}C_5Me_4SiMe_2NCH(Me)(Ph)\}Cl(\mu\text{-}Cl)]_2$, 232
Enterobactin
Synthesis of the smallest tris-(catecholamide) siderophore analogue, 149
EPR
Synthesis and characterization of novel charge transfer complexes formed by *N*,*N*′-bis(ferrocenylmethylidene)-*p*-phenylenediamine and *N*-(ferrocenylmethylidene)aniline, 108
Ether alcohol
Electronic and steric factors affecting the formation of four or five-coordinated aluminum complexes: syntheses and crystal structures of some aluminum alkoxides, 67

Ferrocene
Synthesis and characterization of novel charge transfer complexes formed by *N*,*N*′-bis(ferrocenylmethylidene)-*p*-phenylenediamine and *N*-(ferrocenylmethylidene)aniline, 108
Synthesis, spectroscopy and structure of new push–pull ferrocene complexes containing heteroaromatic rings (thiophene and furan) in the conjugation chain, 301
Ferrocenes
Tuning the link of doubly silyl-bridged ferrocenes, 33
Force constants
A new approach to solving the CO-factored force field of $M(CO)_4$ molecules having C_{3v} symmetry, 209
Furan
Synthesis, spectroscopy and structure of new push–pull ferrocene complexes containing heteroaromatic rings (thiophene and furan) in the conjugation chain, 301

Gold
Reactivity of bis(diphenylphosphines)digold(I) dications with azotate neutral heterocycles: X-ray crystal structure of eclipsed $[\mu\text{-}dppmAu_2(pzH)_2]^{2+} \cdot 2ClO_4^- \cdot H_2O$ and staggered $[\mu\text{-}dppeAu_2(pzH)_2]^{2+} \cdot 2ClO_4^-$ complexes, 269

Gold(I) compounds
Weak interactions and tautomerism in 3,5-dinitrosubstituted 2- and 4-hydroxypyridines and products of their reaction with $[O(AuPPh_3)_3]BF_4$: synthesis, X-ray structure, IR and UV spectroscopy, and quantum chemical calculations, 39
Grignard reaction
Solvation effects in partially solvated Grignard reagents, 182
Grignard reagents
Solvation effects in partially solvated Grignard reagents, 182

^1H-, ^{13}C-, ^{29}Si- and ^{31}P-NMR
Synthese und Charakterisierung von langkettigen Alkysilylphosphonaten und Alkylsilylphosphiten, 126
Hetero arene complex
Synthesis of tricarbonyl(η^6-quinaldine)chromium(0) by a low pressure method, 141
Heterobimetallic complex
Desulfurization and ring opening of thiirane induced by tantalocene trihydride complexes: synthesis, reactivity and X-ray structure of $Cp'_2Ta(=S)(S\text{-}^iPr)$ with $Cp' = \eta^5\text{-}C_5H'_4Bu$, 278
Synthesis and reactivity of Mo–Sn compounds: X-ray crystal structure of a novel $[Mo(SnCl_3)_2(CO)_2(NCEt)_3]$, 98
Heterobinuclear complex
Directional Fe–C≡O···S intermolecular interaction leading to chain-like crystal packing in binuclear Fe(0)–M(II) (M = Hg, Cd) complexes with 2-(diphenylphosphino)thiazole, 51
Heterocyclic carbene
Homoleptic chelating *N*-heterocyclic carbene complexes of palladium and nickel, 80
Heterometallic
$\{M_3S_2\}$ heterometallic aggregates derived from $Pt_2(PPh_3)_4(\mu\text{-}S)_2$: structural analysis of $[MPt_2X(PPh_3)_5(\mu_3\text{-}S)_2]^+$ (M = Pd and Pt, X = Cl; M = Rh and Ir, X = CO) by X-ray single-crystal crystallography, 223
Hydrosilation
Ein einfacher Zugang zu Carbosiloxan-Dendrimeren, 153
Hydrozirconation
Oxovanadium(V)-induced oxidation of alkenylzirconocenes for facile inter- and intramolecular coupling, 76

2-Imidazoline
2-Imidazoline– and 1,4,5,6-tetrahydropyrimidine–ruthenium(II) complexes and catalytic synthesis of furan, 187
Infrared spectra
A new approach to solving the CO-factored force field of $M(CO)_4$ molecules having C_{3v} symmetry, 209
Intermolecular interaction
Directional Fe–C≡O···S intermolecular interaction leading to chain-like crystal packing in binuclear Fe(0)–M(II) (M = Hg, Cd) complexes with 2-(diphenylphosphino)thiazole, 51
IR
Synthesis and characterization of novel charge transfer complexes formed by *N*,*N*′-bis(ferrocenylmethylidene)-*p*-phenylenediamine and *N*-(ferrocenylmethylidene)aniline, 108
Weak interactions and tautomerism in 3,5-dinitrosubstituted 2- and 4-hydroxypyridines and products of their reaction with $[O(AuPPh_3)_3]BF_4$: synthesis, X-ray structure, IR and UV spectroscopy, and quantum chemical calculations, 39
Isocyanate
Syntheses, reactivity studies and structural characterisation of triruthenium carbonyl methoxynitrido clusters containing phosphine ligands, 200

Laser-induced photolysis
UV laser-induced photolysis of silacyclopent-3-ene: unseparable photochemistry of reactant and product for chemical vapour deposition of Si/C/H polymer, 246
Ligand exchange reaction
Synthesis of tricarbonyl(η^6-quinaldine)chromium(0) by a low pressure method, 141
Linked amido-cyclopentadienyl ligands
Synthesis and characterisation of enantiomerically-pure zirconium complexes containing a linked amido-cyclopentadienyl ligand; X-ray structures of $[Zr\{\eta^5{:}\eta^1\text{-}C_5Me_4SiMe_2NCH(Me)(Ph)\}X_2]$ (X = NMe_2 and Cl) and $[Zr\{\eta^5{:}\eta^1\text{-}C_5Me_4SiMe_2NCH(Me)(Ph)\}Cl(\mu\text{-}Cl)]_2$, 232
Long chain alkylchlorosilanes
Synthese und Charakterisierung von langkettigen Alkysilylphosphonaten und Alkylsilylphosphiten, 126

Metalloboranes
The '1,2 to 1,2' cage carbon isomerisation in bisphosphine carbanickelaboranes: synthesis and spectroscopic and crystallographic characterisation of 1,2-Ph_2-4,4-$(PMe_2Ph)_2$-4,1,2-*closo*-$NiC_2B_9H_9$, 1,2-Ph_2-4,4-$(PEt_3)_2$-4,1,2-*closo*-$NiC_2B_9H_9$ and 1,2-Ph_2-4-(dppe)-4,1,2-*closo*-$NiC_2B_9H_9$, 57
Metallocenyl phosphine
Ruthenocenyl ruthenium bimetallic complexes: electrospray mass spectrometric study of $[RuX(\eta^5\text{-}C_5H_5)(\eta^2\text{-dppr})]^{n+}$ (dppr = 1,1′-bis(diphenylphosphino)ruthenocene) (X = Cl, $n = 0$; X = CO, CH_3CN, C=CHPh, $n = 1$) and the X-ray crystal and molecular structure of $[Ru(\eta^5\text{-}C_5H_5)(CO)(\eta^2\text{-dppr})]PF_6$, 171
2-Methoxybenzyl alcohol
Electronic and steric factors affecting the formation of four or five-coordinated aluminum complexes: syntheses and crystal structures of some aluminum alkoxides, 67
Methoxynitrido
Syntheses, reactivity studies and structural characterisation of triruthenium carbonyl methoxynitrido clusters containing phosphine ligands, 200
Molybdenum(II)
Synthesis and reactivity of Mo–Sn compounds: X-ray crystal structure of a novel $[Mo(SnCl_3)_2(CO)_2(NCEt)_3]$, 98
Mössbauer spectroscopy
Synthesis and characterization of novel charge transfer complexes formed by *N*,*N*′-bis(ferrocenylmethylidene)-*p*-phenylenediamine and *N*-(ferrocenylmethylidene)aniline, 108

Nickel
Homoleptic chelating *N*-heterocyclic carbene complexes of palladium and nickel, 80
Nickel complex catalysis
Nickel-catalysed electrochemical coupling between mono- or dichlorophenylphosphines and aryl or heteroaryl halides, 63
Nitrido-rhenium
The complex $[ReO\{HNN(CH_3)CS_2CH_3\}_2]Cl$, a suitable precursor for the preparation of bis(dithiocarbamato)nitridorhenium(V) species, 145
Nitrile complexes
Synthesis and reactivity of Mo–Sn compounds: X-ray crystal structure of a novel $[Mo(SnCl_3)_2(CO)_2(NCEt)_3]$, 98
N-methyl-S-methyldithiocarbazate
The complex $[ReO\{HNN(CH_3)CS_2CH_3\}_2]Cl$, a suitable precursor for the preparation of bis(dithiocarbamato)nitridorhenium(V) species, 145
NMR spectroscopy
Methylmercury(II) and phenylmercury(II) chelated complexes with the ligand tris(2-diphenylphosphinoethyl)phosphine: synthesis, X-ray diffraction and NMR studies, 119
Nonlinear optics
Synthesis, spectroscopy and structure of new push–pull ferrocene complexes containing heteroaromatic rings (thiophene and furan) in the conjugation chain, 301
Nucleophilic attack
Nucleophilic addition to ruthenium activated tetramethylthiophene, 242

One-pot synthesis
The complex [ReO{HNN(CH$_3$)CS$_2$CH$_3$}$_2$]Cl, a suitable precursor for the preparation of bis(dithiocarbamato)nitridorhenium(V) species, 145
Organomanganese reagents
Use of organomanganese reagents in organic synthesis, 1
Organomercurials
Methylmercury(II) and phenylmercury(II) chelated complexes with the ligand tris(2-diphenylphosphinoethyl)phosphine: synthesis, X-ray diffraction and NMR studies, 119
Organozirconocene compound
Oxovanadium(V)-induced oxidation of alkenylzirconocenes for facile inter- and intramolecular coupling, 76
Oxidative coupling
Oxovanadium(V)-induced oxidation of alkenylzirconocenes for facile inter- and intramolecular coupling, 76
Oxovanadium
Oxovanadium(V)-induced oxidation of alkenylzirconocenes for facile inter- and intramolecular coupling, 76

Palladium
Homoleptic chelating *N*-heterocyclic carbene complexes of palladium and nickel, 80
Reactivity of [Pd$_3$(μ-O$_2$CMe)$_3$(μ-MeSCHC(O)OR)$_3$] (R = Me, Et) towards bidentate nucleophiles: X-ray structure of [Pd$_2$(acac)$_2$(μ-MeSCHC(O)OEt)$_2$], 163
Palladium-triflate
Transition metal complexes with sterically demanding ligands. I. Synthesis and X-ray crystal structure of 1,5-cyclooctadiene palladium methyl triflate, (COD)Pd(Me)(OTf) and its cationic penta-coordinate adducts with sterically demanding 2,9-diaryl-substituted 1,10-phenanthroline ligands, 214
2-Phenoxyethanol
Electronic and steric factors affecting the formation of four or five-coordinated aluminum complexes: syntheses and crystal structures of some aluminum alkoxides, 67
Phosphine
Syntheses, reactivity studies and structural characterisation of triruthenium carbonyl methoxynitrido clusters containing phosphine ligands, 200
Phosphine complexes
Methylmercury(II) and phenylmercury(II) chelated complexes with the ligand tris(2-diphenylphosphinoethyl)phosphine: synthesis, X-ray diffraction and NMR studies, 119
Phosphines
Novel rhodium(I) complexes with (2-hydroxyphenyl)-diphenylphosphine ligand: catalytic properties and X-ray structures of Rh(OC$_6$H$_4$PPh$_2$)(CO)(PPh$_3$) and Rh(OC$_6$H$_4$PPh$_2$){P(OPh)$_3$}$_2$ · 0.5C$_6$H$_6$, 87
Platinum
{M$_3$S$_2$} heterometallic aggregates derived from Pt$_2$(PPh$_3$)$_4$(μ-S)$_2$: structural analysis of [MPt$_2$X(PPh$_3$)$_5$(μ_3-S)$_2$]$^+$ (M = Pd and Pt, X = Cl; M = Rh and Ir, X = CO) by X-ray single-crystal crystallography, 223
Protochelin
Synthesis of the smallest tris-(catecholamide) siderophore analogue, 149

Quantum chemical calculations
Weak interactions and tautomerism in 3,5-dinitrosubstituted 2- and 4-hydroxypyridines and products of their reaction with [O(AuPPh$_3$)$_3$]BF$_4$: synthesis, X-ray structure, IR and UV spectroscopy, and quantum chemical calculations, 39
Quinoline
Synthesis of tricarbonyl(η^6-quinaldine)chromium(0) by a low pressure method, 141

Radical cyclization
Use of organomanganese reagents in organic synthesis, 1

Regiospecific
Silicon-directed acid ring-opening of allyltrimethylsilane oxide. X-ray structures of 3-triisopropylsilyl-2-(2,4-dinitrobenzoyloxy)-1-propanol and 3-triisopropylsilyl-2-(2,4,6-trinitrobenzoyloxy)-1-propanol, 251
Rhodium complexes
Novel rhodium(I) complexes with (2-hydroxyphenyl)diphenylphosphine ligand: catalytic properties and X-ray structures of Rh(OC$_6$H$_4$PPh$_2$)(CO)(PPh$_3$) and Rh(OC$_6$H$_4$PPh$_2$){P(OPh)$_3$}$_2$ · 0.5C$_6$H$_6$, 87
Ring opening
Silicon-directed acid ring-opening of allyltrimethylsilane oxide. X-ray structures of 3-triisopropylsilyl-2-(2,4-dinitrobenzoyloxy)-1-propanol and 3-triisopropylsilyl-2-(2,4,6-trinitrobenzoyloxy)-1-propanol, 251
Ruthenium
2-Imidazoline– and 1,4,5,6-tetrahydropyrimidine–ruthenium(II) complexes and catalytic synthesis of furan, 187
Nucleophilic addition to ruthenium activated tetramethylthiophene, 242
Ruthenocenyl ruthenium bimetallic complexes: electrospray mass spectrometric study of [RuX(η^5-C$_5$H$_5$)(η^2-dppr)]$^{n+}$ (dppr = 1,1′-bis(diphenylphosphino)ruthenocene) (X = Cl, n = 0; X = CO, CH$_3$CN, C=CHPh, n = 1) and the X-ray crystal and molecular structure of [Ru(η^5-C$_5$H$_5$)(CO)(η^2-dppr)]PF$_6$, 171
Syntheses, reactivity studies and structural characterisation of triruthenium carbonyl methoxynitrido clusters containing phosphine ligands, 200

Second generation
Ein einfacher Zugang zu Carbosiloxan-Dendrimeren, 153
Seven-coordinate
Synthesis and reactivity of Mo–Sn compounds: X-ray crystal structure of a novel [Mo(SnCl$_3$)$_2$(CO)$_2$(NCEt)$_3$], 98
Si/C/H polymer
UV laser-induced photolysis of silacyclopent-3-ene: unseparable photochemistry of reactant and product for chemical vapour deposition of Si/C/H polymer, 246
Siderophore
Synthesis of the smallest tris-(catecholamide) siderophore analogue, 149
Silacyclopent-3-ene
UV laser-induced photolysis of silacyclopent-3-ene: unseparable photochemistry of reactant and product for chemical vapour deposition of Si/C/H polymer, 246
Silver(I)
(η^5-C$_5$H$_4$SiMe$_3$)$_2$Ti(C≡C–SiMe$_2$–C≡CSiMe$_3$)$_2$: a unique entry to monomeric and oligomeric alkyne–copper(I) and alkyne–silver(I) halides, 133
Silyl bridges
Tuning the link of doubly silyl-bridged ferrocenes, 33
Silylene
UV laser-induced photolysis of silacyclopent-3-ene: unseparable photochemistry of reactant and product for chemical vapour deposition of Si/C/H polymer, 246
Skeletal rearrangements
The '1,2 to 1,2' cage carbon isomerisation in bisphosphine carbanickelaboranes: synthesis and spectroscopic and crystallographic characterisation of 1,2-Ph$_2$-4,4-(PMe$_2$Ph)$_2$-4,1,2-*closo*-NiC$_2$B$_9$H$_9$, 1,2-Ph$_2$-4,4-(PEt$_3$)$_2$-4,1,2-*closo*-NiC$_2$B$_9$H$_9$ and 1,2-Ph$_2$-4-(dppe)-4,1,2-*closo*-NiC$_2$B$_9$H$_9$, 57
Solvation effects
Solvation effects in partially solvated Grignard reagents, 182
Spectra
Synthesis, spectra and crystal structure of (*E*)-(CO)$_2$(NO)Cr[(η^5-C$_5$H$_4$)–CH=CH(η^5-C$_5$H$_4$)]Cr(CO)$_2$(NO), 310

Sterically demanding phenanthroline ligands
Transition metal complexes with sterically demanding ligands. I. Synthesis and X-ray crystal structure of 1,5-cyclooctadiene palladium methyl triflate, (COD)Pd(Me)(OTf) and its cationic penta-coordinate adducts with sterically demanding 2,9-diaryl-substituted 1,10-phenanthroline ligands, 214
Structures
Reactivity of bis(diphenylphosphines)digold(I) dications with azotate neutral heterocycles: X-ray crystal structure of eclipsed $[\mu\text{-dppmAu}_2(pzH)_2]^{2+} \cdot 2ClO_4^- \cdot H_2O$ and staggered $[\mu\text{-dppeAu}_2(pzH)_2]^{2+} \cdot 2ClO_4^-$ complexes, 269
Sulfide
$\{M_3S_2\}$ heterometallic aggregates derived from $Pt_2(PPh_3)_4(\mu\text{-}S)_2$: structural analysis of $[MPt_2X(PPh_3)_5(\mu_3\text{-}S)_2]^+$ (M = Pd and Pt, X = Cl; M = Rh and Ir, X = CO) by X-ray single-crystal crystallography, 223
Sulfur ligands
Reactivity of $[Pd_3(\mu\text{-}O_2CMe)_3(\mu\text{-MeSCHC(O)OR})_3]$ (R = Me, Et) towards bidentate nucleophiles: X-ray structure of $[Pd_2(acac)_2(\mu\text{-MeSCHC(O)OEt})_2]$, 163
Synthesis
Synthese und Charakterisierung von langkettigen Alkysilylphosphonaten und Alkylsilylphosphiten, 126
Synthesis, spectra and crystal structure of (*E*)-$(CO)_2(NO)Cr[(\eta^5\text{-}C_5H_4)\text{-}CH{=}CH(\eta^5\text{-}C_5H_4)]Cr(CO)_2(NO)$, 310

Tantalocene hydrides
Desulfurization and ring opening of thiirane induced by tantalocene trihydride complexes: synthesis, reactivity and X-ray structure of $Cp'_2Ta(=S)(S\text{-}^iPr)$ with $Cp' = \eta^5\text{-}C_5H'_4Bu$, 278
Tautomerism
Weak interactions and tautomerism in 3,5-dinitrosubstituted 2- and 4-hydroxypyridines and products of their reaction with $[O(AuPPh_3)_3]BF_4$: synthesis, X-ray structure, IR and UV spectroscopy, and quantum chemical calculations, 39

Tellurium
Dimethyl tellurium (IV) derivatives: synthesis, spectroscopic characterisation and structures of Me_2TeBr_2 and $Me_2Te(OCOC_6H_5)_2$, 261
Tertiary phosphines
Nickel-catalysed electrochemical coupling between mono- or dichlorophenylphosphines and aryl or heteroaryl halides, 63
Tetracarbonyls
A new approach to solving the CO-factored force field of $M(CO)_4$ molecules having C_{3v} symmetry, 209
1,4,5,6-Tetrahydropyrimidine
2-Imidazoline- and 1,4,5,6-tetrahydropyrimidine–ruthenium(II) complexes and catalytic synthesis of furan, 187
Thiazole-based phosphine ligand
Directional Fe–C≡O···S intermolecular interaction leading to chain-like crystal packing in binuclear Fe(0)–M(II) (M = Hg, Cd) complexes with 2-(diphenylphosphino)thiazole, 51
Thiirane
Desulfurization and ring opening of thiirane induced by tantalocene trihydride complexes: synthesis, reactivity and X-ray structure of $Cp'_2Ta(=S)(S\text{-}^iPr)$ with $Cp' = \eta^5\text{-}C_5H'_4Bu$, 278
Thioether [9]aneS_3
Nucleophilic addition to ruthenium activated tetramethylthiophene, 242
Thiophene
Nucleophilic addition to ruthenium activated tetramethylthiophene, 242
Synthesis, spectroscopy and structure of new push–pull ferrocene complexes containing heteroaromatic rings (thiophene and furan) in the conjugation chain, 301
Tin
Reaction of dibutyltin oxide with amides in presence of traces of water: multinuclear NMR study and mechanism, 286
Synthesis and reactivity of Mo–Sn compounds: X-ray crystal structure of a novel $[Mo(SnCl_3)_2(CO)_2(NCEt)_3]$, 98
Titanocene
$(\eta^5\text{-}C_5H_4SiMe_3)_2Ti(C{\equiv}C\text{–}SiMe_2\text{–}C{\equiv}CSiMe_3)_2$: a unique entry to monomeric and oligomeric alkyne–copper(I) and alkyne–silver(I) halides, 133
Triangular
$\{M_3S_2\}$ heterometallic aggregates derived from $Pt_2(PPh_3)_4(\mu\text{-}S)_2$: structural analysis of $[MPt_2X(PPh_3)_5(\mu_3\text{-}S)_2]^+$ (M = Pd and Pt, X = Cl; M = Rh and Ir, X = CO) by X-ray single-crystal crystallography, 223
Triflate ionization
Transition metal complexes with sterically demanding ligands. I. Synthesis and X-ray crystal structure of 1,5-cyclooctadiene palladium methyl triflate, (COD)Pd(Me)(OTf) and its cationic penta-coordinate adducts with sterically demanding 2,9-diaryl-substituted 1,10-phenanthroline ligands, 214
Trigonal-bipyramidal Pd complexes
Transition metal complexes with sterically demanding ligands. I. Synthesis and X-ray crystal structure of 1,5-cyclooctadiene palladium methyl triflate, (COD)Pd(Me)(OTf) and its cationic penta-coordinate adducts with sterically demanding 2,9-diaryl-substituted 1,10-phenanthroline ligands, 214

Ultrasound
Solvation effects in partially solvated Grignard reagents, 182
UV
Weak interactions and tautomerism in 3,5-dinitrosubstituted 2- and 4-hydroxypyridines and products of their reaction with $[O(AuPPh_3)_3]BF_4$: synthesis, X-ray structure, IR and UV spectroscopy, and quantum chemical calculations, 39
UV–vis
Synthesis and characterization of novel charge transfer complexes formed by *N*,*N*′-bis(ferrocenylmethylidene)-*p*-phenylenediamine and *N*-(ferrocenylmethylidene)aniline, 108

Vinylidene
Ruthenocenyl ruthenium bimetallic complexes: electrospray mass spectrometric study of $[RuX(\eta^5\text{-}C_5H_5)(\eta^2\text{-dppr})]^{n+}$ (dppr = 1,1′-bis(diphenylphosphino)ruthenocene) (X = Cl, $n = 0$; X = CO, CH_3CN, C=CHPh, $n = 1$) and the X-ray crystal and molecular structure of $[Ru(\eta^5\text{-}C_5H_5)(CO)(\eta^2\text{-dppr})]PF_6$, 171

Weak interaction
Weak interactions and tautomerism in 3,5-dinitrosubstituted 2- and 4-hydroxypyridines and products of their reaction with $[O(AuPPh_3)_3]BF_4$: synthesis, X-ray structure, IR and UV spectroscopy, and quantum chemical calculations, 39

X-ray crystallography
Weak interactions and tautomerism in 3,5-dinitrosubstituted 2- and 4-hydroxypyridines and products of their reaction with $[O(AuPPh_3)_3]BF_4$: synthesis, X-ray structure, IR and UV spectroscopy, and quantum chemical calculations, 39
X-ray single-crystal crystallography
$\{M_3S_2\}$ heterometallic aggregates derived from $Pt_2(PPh_3)_4(\mu\text{-}S)_2$: structural analysis of $[MPt_2X(PPh_3)_5(\mu_3\text{-}S)_2]^+$ (M = Pd and Pt, X = Cl; M = Rh and Ir, X = CO) by X-ray single-crystal crystallography, 223
X-ray structure
Novel rhodium(I) complexes with (2-hydroxyphenyl)diphenylphosphine ligand: catalytic properties and X-ray structures of $Rh(OC_6H_4PPh_2)(CO)(PPh_3)$ and $Rh(OC_6H_4\text{-}PPh_2)\{P(OPh)_3\}_2 \cdot 0.5C_6H_6$, 87

Zirconium
Synthesis and characterisation of enantiomerically-pure zirconium complexes containing a linked amido-cyclopentadienyl ligand; X-ray structures of $[Zr\{\eta^5{:}\eta^1\text{-}C_5Me_4SiMe_2\text{-}NCH(Me)(Ph)\}X_2]$ (X = NMe_2 and Cl) and $[Zr\{\eta^5{:}\eta^1\text{-}C_5Me_4SiMe_2NCH(Me)(Ph)\}Cl(\mu\text{-}Cl)]_2$, 232